FIG. 1

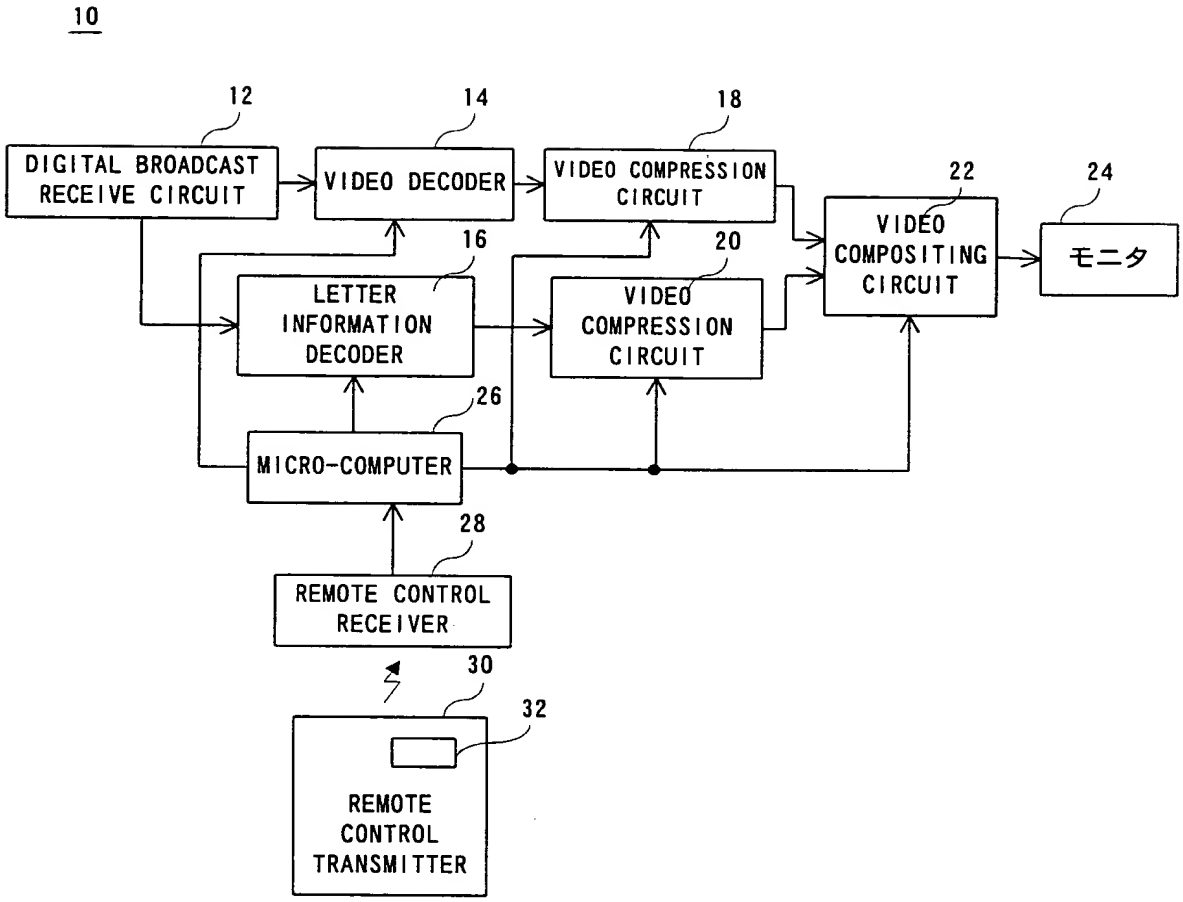

10
12
DIGITAL BROADCAST RECEIVE CIRCUIT
14
VIDEO DECODER
18
VIDEO COMPRESSION CIRCUIT
22
VIDEO COMPOSITING CIRCUIT
24
モニタ
16
LETTER INFORMATION DECODER
20
VIDEO COMPRESSION CIRCUIT
26
MICRO-COMPUTER
28
REMOTE CONTROL RECEIVER
30
32
REMOTE CONTROL TRANSMITTER

FIG. 2

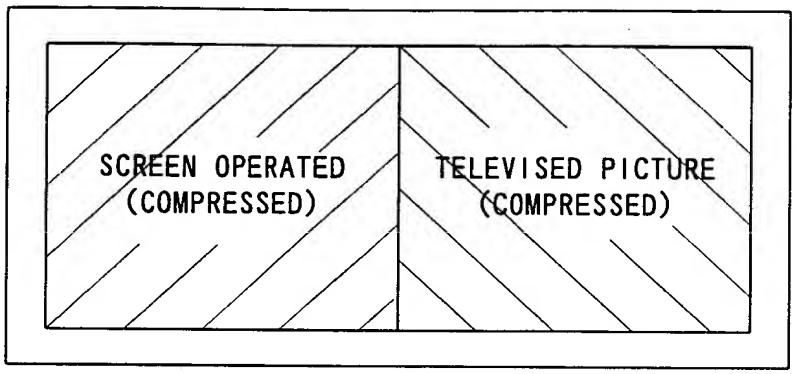

SCREEN OPERATED
(COMPRESSED)
TELEVISED PICTURE
(COMPRESSED)

FIG. 3

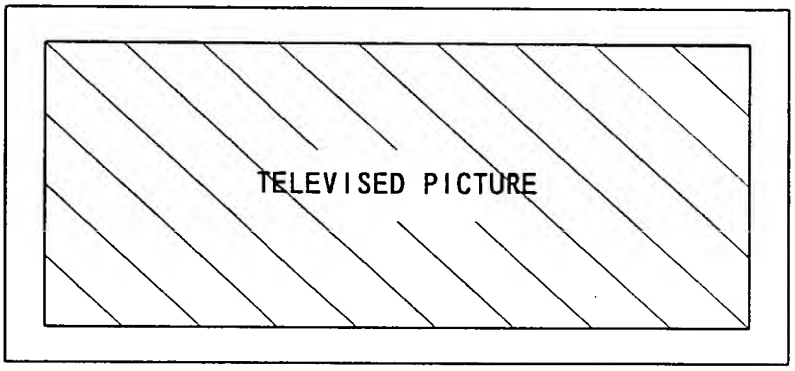

TELEVISED PICTURE

FIG. 4

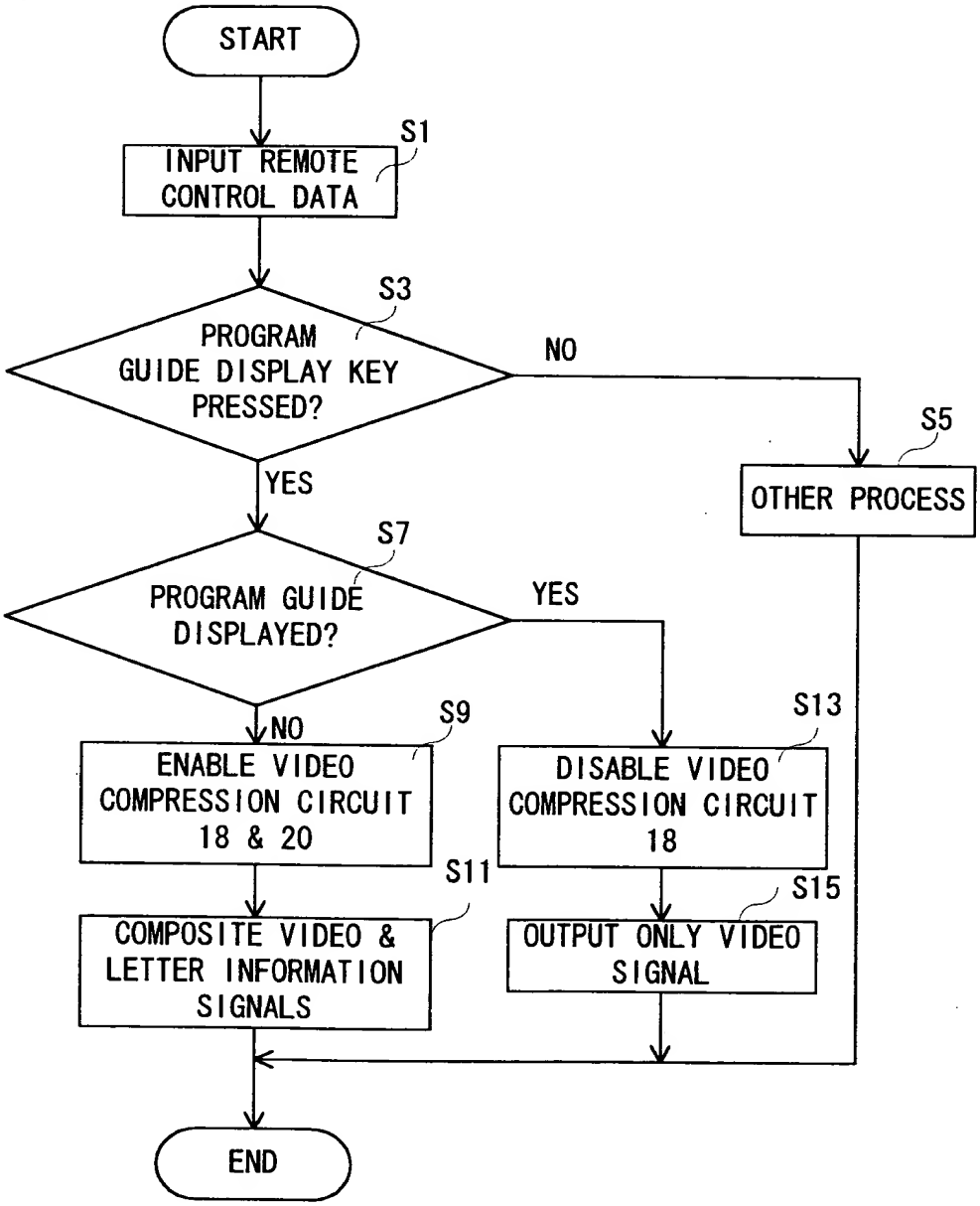

START
S1
INPUT REMOTE CONTROL DATA
S3
PROGRAM GUIDE DISPLAY KEY PRESSED?
NO
S5
OTHER PROCESS
YES
S7
PROGRAM GUIDE DISPLAYED?
YES
NO
S9
ENABLE VIDEO COMPRESSION CIRCUIT 18 & 20
S13
DISABLE VIDEO COMPRESSION CIRCUIT 18
S11
COMPOSITE VIDEO & LETTER INFORMATION SIGNALS
S15
OUTPUT ONLY VIDEO SIGNAL
END

FIG. 5

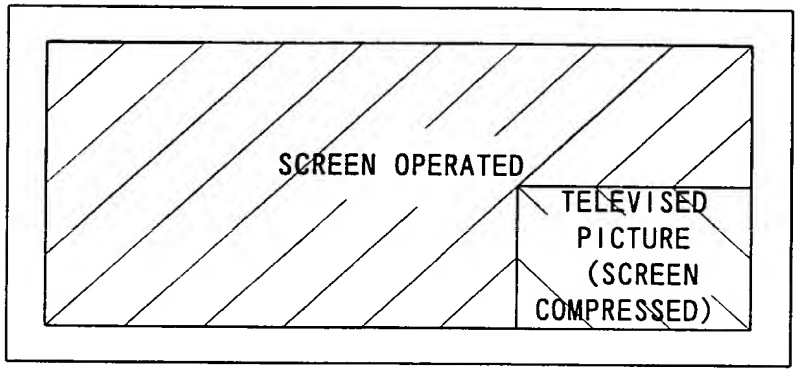

SCREEN OPERATED
TELEVISED PICTURE (SCREEN COMPRESSED)

FIG. 6

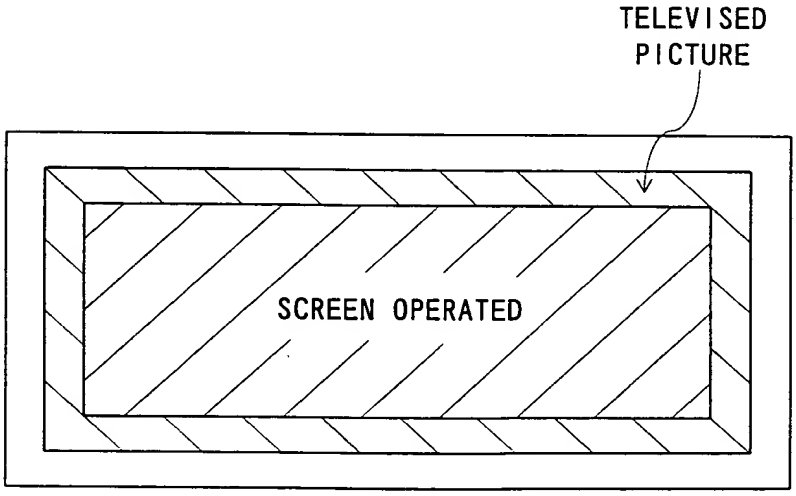

TELEVISED PICTURE
SCREEN OPERATED

FIG. 7

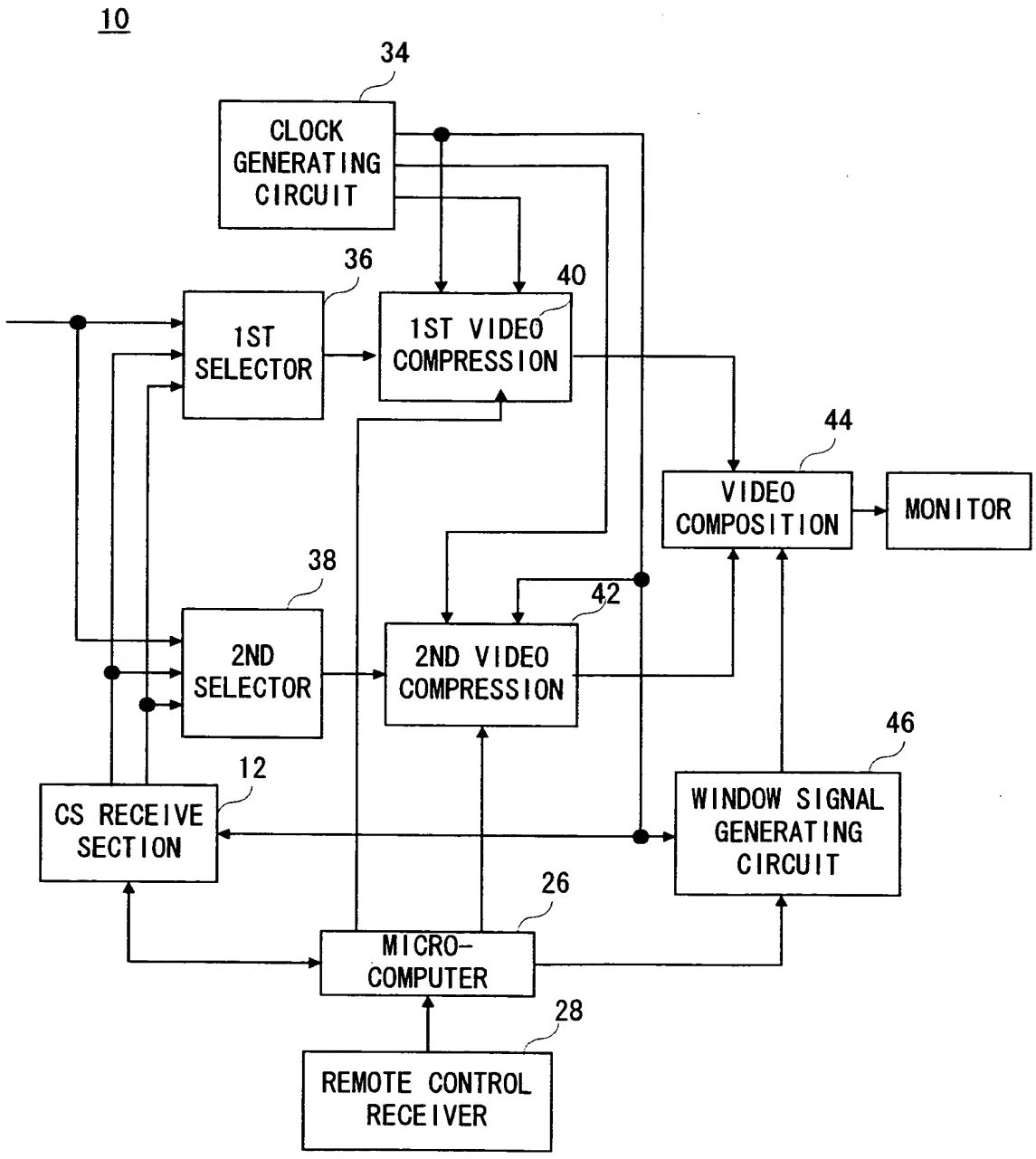

10
34
CLOCK GENERATING CIRCUIT
36
1ST SELECTOR
40
1ST VIDEO COMPRESSION
44
VIDEO COMPOSITION
MONITOR
38
2ND SELECTOR
42
2ND VIDEO COMPRESSION
46
12
CS RECEIVE SECTION
WINDOW SIGNAL GENERATING CIRCUIT
26
MICRO-COMPUTER
28
REMOTE CONTROL RECEIVER

FIG. 8

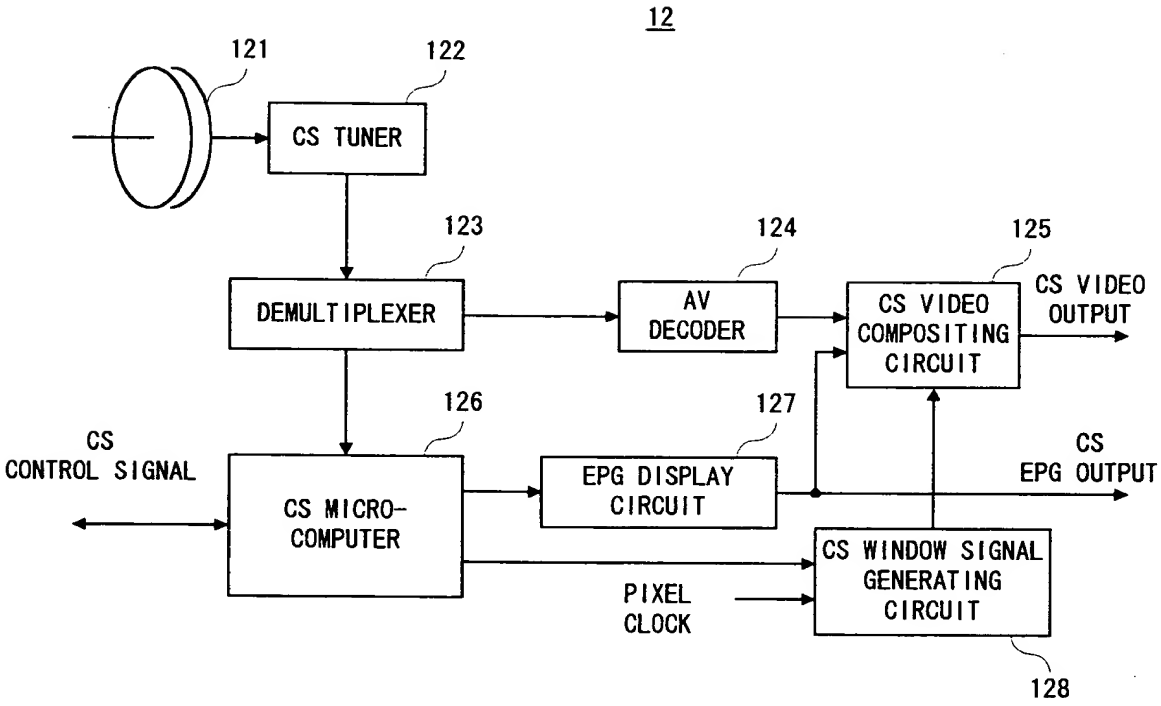

12
121
122
CS TUNER
123
DEMULTIPLEXER
124
AV DECODER
125
CS VIDEO COMPOSITING CIRCUIT
CS VIDEO OUTPUT
126
CS CONTROL SIGNAL
CS MICRO-COMPUTER
127
EPG DISPLAY CIRCUIT
CS EPG OUTPUT
CS WINDOW SIGNAL GENERATING CIRCUIT
PIXEL CLOCK
128

FIG. 9

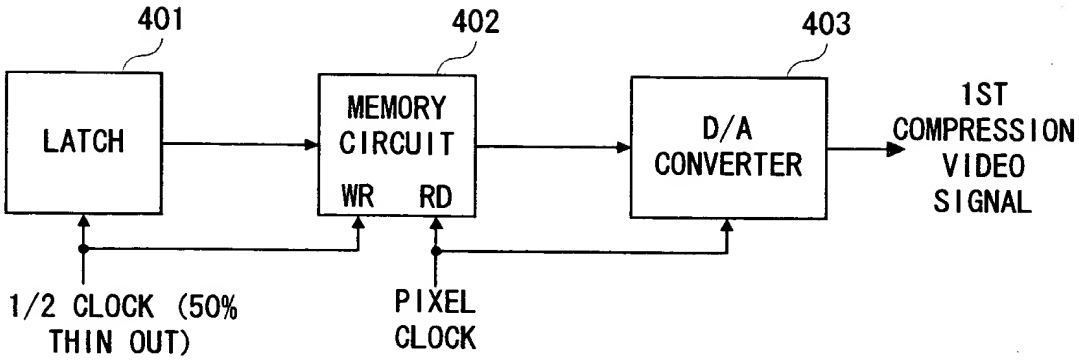
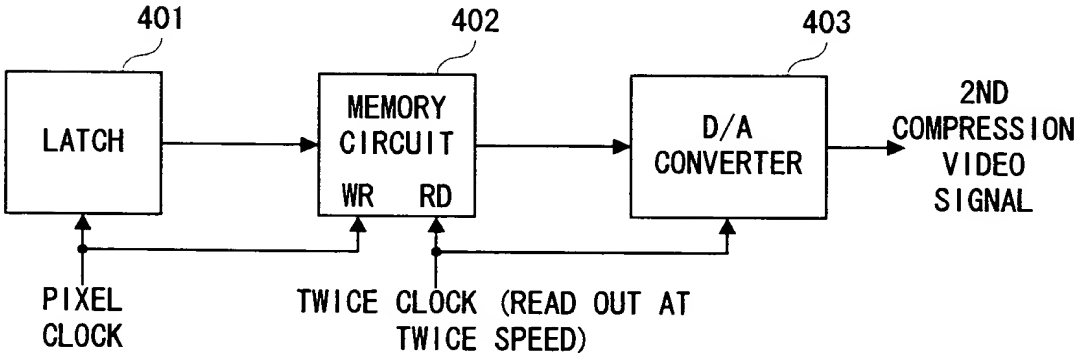

401
402
403
LATCH
MEMORY CIRCUIT
WR RD
D/A CONVERTER
1ST COMPRESSION VIDEO SIGNAL
1/2 CLOCK (50% THIN OUT)
PIXEL CLOCK

FIG. 10


401
402
403
LATCH
MEMORY CIRCUIT
WR RD
D/A CONVERTER
2ND COMPRESSION VIDEO SIGNAL
PIXEL CLOCK
TWICE CLOCK (READ OUT AT TWICE SPEED)

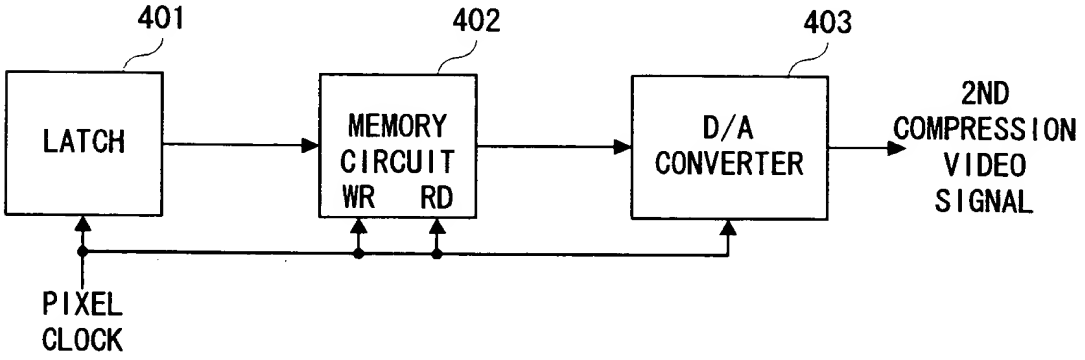

401
402
403
LATCH
MEMORY CIRCUIT
WR RD
D/A CONVERTER
2ND COMPRESSION VIDEO SIGNAL
PIXEL CLOCK

FIG. 11

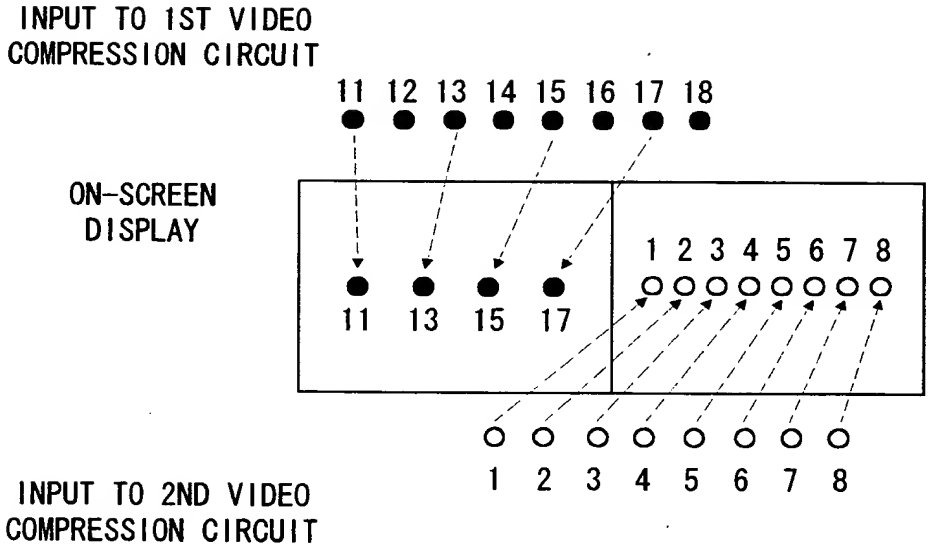

INPUT TO 1ST VIDEO COMPRESSION CIRCUIT
11 12 13 14 15 16 17 18
ON-SCREEN DISPLAY
1 2 3 4 5 6 7 8
11 13 15 17
1 2 3 4 5 6 7 8
INPUT TO 2ND VIDEO COMPRESSION CIRCUIT

FIG. 12

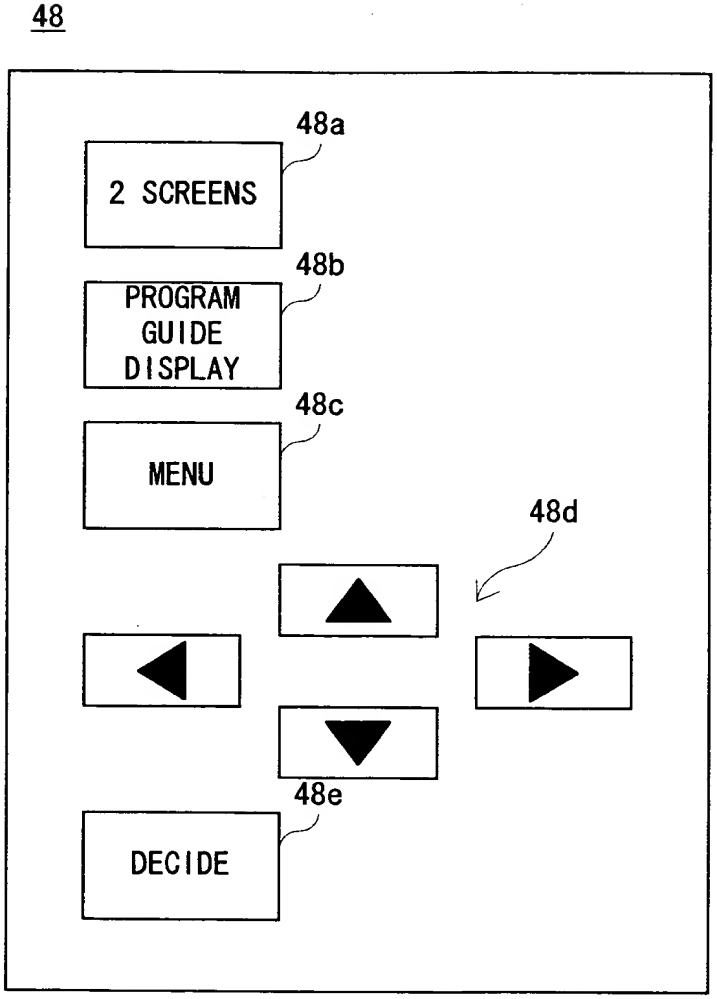

48
48a
2 SCREENS
48b
PROGRAM GUIDE DISPLAY
48c
MENU
48d
48e
DECIDE

FIG. 13

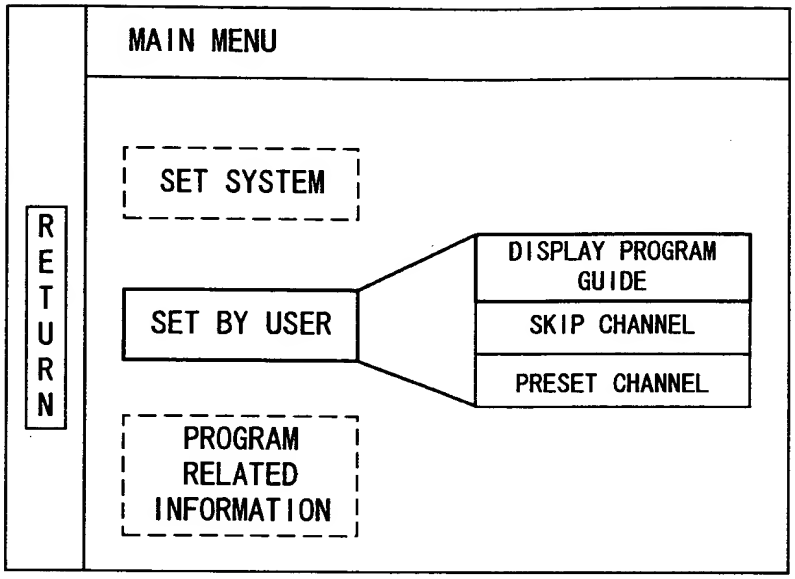

MAIN MENU
RETURN
SET SYSTEM
SET BY USER
DISPLAY PROGRAM GUIDE
SKIP CHANNEL
PRESET CHANNEL
PROGRAM RELATED INFORMATION

FIG. 14

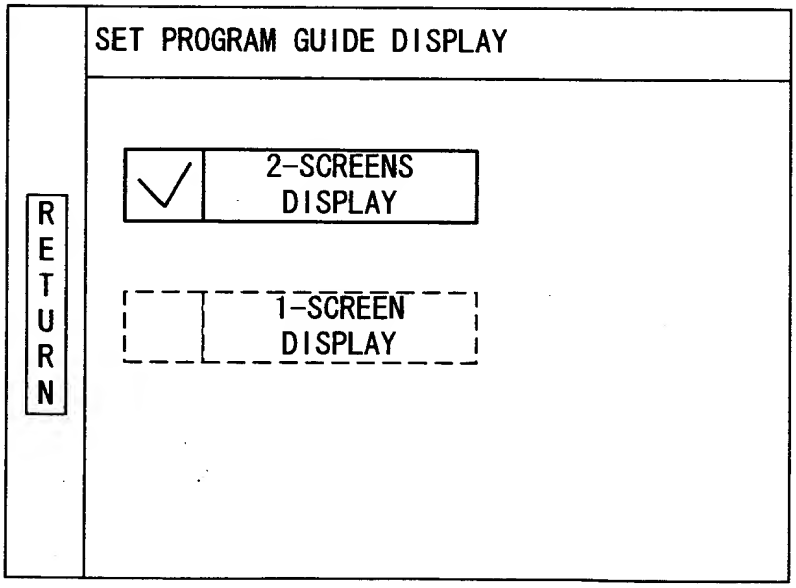

SET PROGRAM GUIDE DISPLAY
RETURN
2-SCREENS DISPLAY
1-SCREEN DISPLAY

FIG. 15

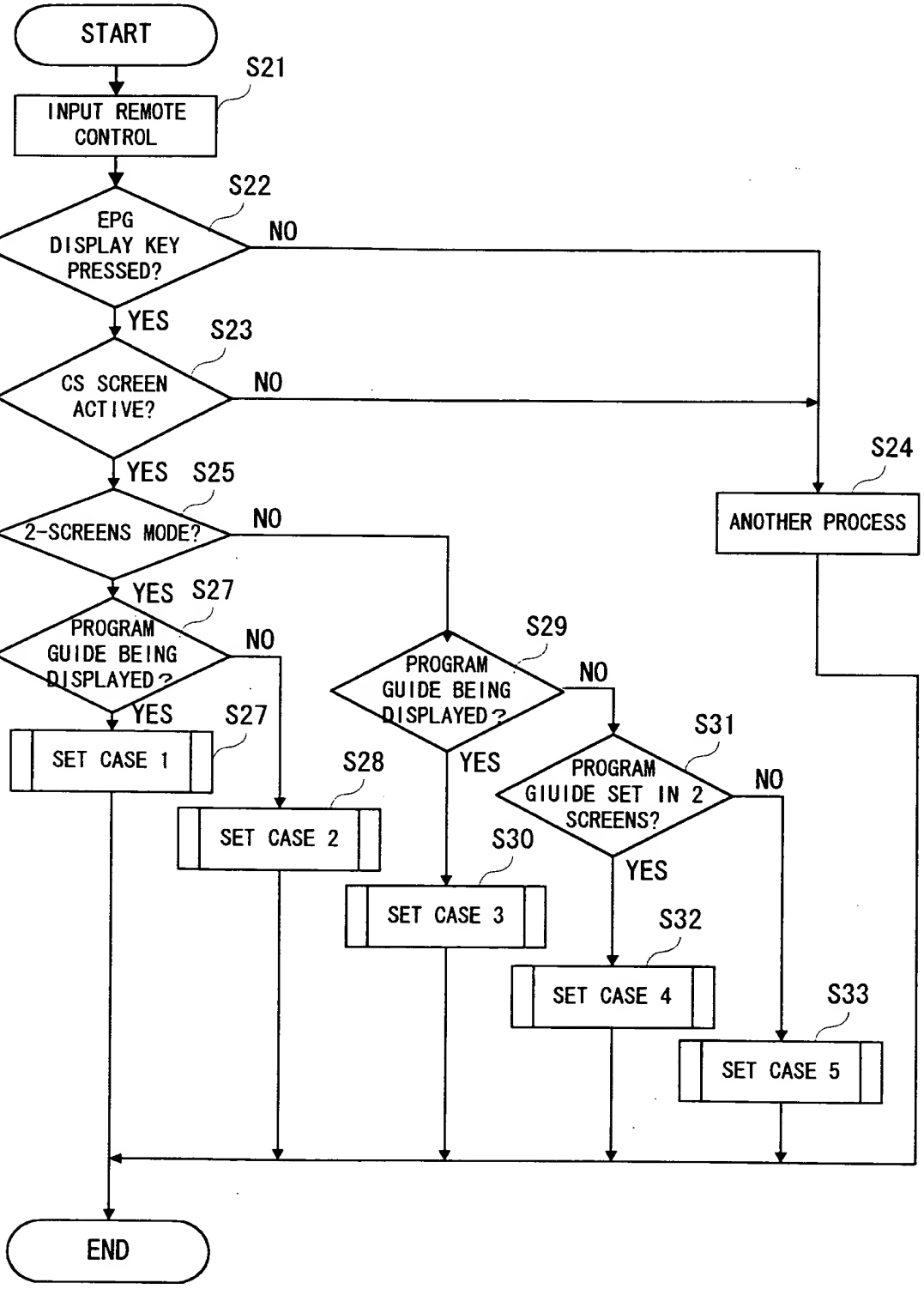

START
S21
INPUT REMOTE CONTROL
S22
EPG DISPLAY KEY PRESSED?
NO
YES
S23
CS SCREEN ACTIVE?
NO
YES
S25
2-SCREENS MODE?
NO
YES
S27
PROGRAM GUIDE BEING DISPLAYED?
NO
YES
S27
SET CASE 1
S28
SET CASE 2
S24
ANOTHER PROCESS
S29
PROGRAM GUIDE BEING DISPLAYED?
NO
YES
S30
SET CASE 3
S31
PROGRAM GIUIDE SET IN 2 SCREENS?
NO
YES
S32
SET CASE 4
S33
SET CASE 5
END

FIG. 16

CASE \ CONTROL	1ST COMPRESSION INPUT	2ND COMPRESSION INPUT	1ST COMPRESSION RATIO	2ND COMPRESSION RATIO	VIDEO COMPOSITION SWITCH WINDOW	CS USUAL OUTPUT SWITCH WINDOW
CASE 1 CS VIDEO / OTHER VIDEO	CS USUAL OUTPUT	ANOTHER OUTPUT	50 %	50 %	1ST COMPRESSION VIDEO / 2ND COMPRESSION VIDEO	VIDEO
CASE 2 CS VOIDEO (EPG) / OTHER VIDEO	CS USUAL OUTPUT	ANOTHER OUTPUT	50 %	50 %	1ST COMPRESSION VIDEO / 2ND COMPRESSION VIDEO	VIDEO (EPG)
CASE 3 CS VIDEO	Don't care	CS USUAL OUTPUT	Don't care	100 %	2ND COMPRESSION VIDEO	VIDEO
CASE 4 EPG / CS VIDEO	CS EPG OUTPUT	CS USUAL OUTPUT	50 %	50 %	2ND COMPRESSION VIDEO	EPG / VIDEO
CASE 5 CS VIDEO (EPG)	Don't care	CS USUAL OUTPUT	Don't care	100 %	2ND COMPRESSION VIDEO	VIDEO (EPG)

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